

REMARKS

In view of the above amendments and the following remarks, reconsideration of the rejections contained in the Office Action of July 26, 2005 is respectfully requested.

The Examiner objected to the title of the invention as not being sufficiently descriptive. However, the title of the present invention has now been amended as indicated above, and the Applicant submits that the new title is sufficiently descriptive of the present invention. Therefore, it is respectfully submitted that the Examiner's objection to the title has been overcome.

In order to make necessary editorial corrections, the entire specification and abstract have been reviewed and revised. As the revisions are quite extensive, the amendments to the specification and abstract have been incorporated into the attached substitute specification and abstract. For the Examiner's benefit, a marked-up copy of the specification indicating the changes made thereto is also enclosed. No new matter has been added by the revisions. Entry of the substitute specification is thus respectfully requested.

In order to perfect the Applicant's claim for priority in this application, a certified copy of the priority document has been submitted with this Amendment. The Examiner is respectfully requested to acknowledge receipt of the certified copy of the priority document.

The Examiner rejected original claims 1-7 as being anticipated by the Minamio reference (U.S. Patent Application Publication 2003/0015775). However, the original claims have now been cancelled and replaced with new claims 8-17. For the reasons discussed below, it is respectfully submitted that the new claims are clearly patentable over the prior art of record.

A description of the present invention will be provided below with reference to various portions of the present application, including the drawings. However, reference to any particular portions of the Application is provided only for illustrative purposes, and is not intended to otherwise limit the scope of the claims to any specific embodiments.

New independent claims 8 and 11 are each directed to a method of fabricating a semiconductor device. As illustrated in, for example, Figures 3A-3D, each of new independent claims 8 and 11 recites that the method comprises *mounting a plurality of semiconductor chips*

20 *on a plurality of leadframes 12*, and the leadframes 12 are arranged side by side and separate from each other. Each of the semiconductor chips 20 has a first main surface 20a and a second main surface 20b opposite the first main surface 20a. Each of the semiconductor chips has a plurality of electrode pads 22 on the first main surface 20a, and the semiconductor chips 20 are mounted *so that the second main surface 20b (i.e., the surface opposite the surface with the electrode pads 22) of each of the semiconductor chips 20 faces the leadframes 12*. As further recited in each of new independent claims 8 and 11, a plurality of semiconductor devices is formed by cutting, and each of the semiconductor devices has one of the semiconductor chips *mounted on a first external terminal row formed of the cut leadframes and mounted on the second external terminal row formed of the cut leadframes* (see page 12, lines 10-24 and page 19, lines 9-15 of the original specification). Consequently, the size of each semiconductor device fabricated using the method of independent claims 8 and 11 can desirably have a smaller shape (see page 21, lines 2-6 of the original specification).

The Minamio reference discloses a resin-encapsulation semiconductor device including a semiconductor element 3 connected to inner leads 4 by metal wires 5. In the outstanding Office Action, the Examiner asserted that the Minamio reference “discloses arranging several of linear leadframes (1 and 4) side by side separately from each other.” However, as clearly explained in paragraph [0055] of the Minamio reference, item 1 of the Minamio reference is a *rectangular die pad*, rather than an *elongated leadframe* as recited in claims 8 and 11. Furthermore, as clearly illustrated in, for example, Figure 1C and described in lines 5 and 6 of paragraph [0055] of the Minamio reference, the semiconductor element 3 is mounted *on the rectangular die pad 1*, rather than leadframes. Thus, the Minamio reference does not disclose or even suggest mounting a plurality of semiconductor chips on leadframes. Furthermore, the Minamio reference does not disclose or suggest cutting leadframes and interframe encapsulation parts to form semiconductor devices, in which each semiconductor device has a semiconductor chip mounted on a first external terminal row formed of the cut leadframes, and mounted on a second external terminal row formed of the cut leadframes. The Minamio reference also does not disclose or suggest that each of the semiconductor chips has a plurality of electrode pads on a first main surface, and that

each of the semiconductor chips is mounted so that a second main surface opposite the first main surface faces leadframes. Therefore, it is respectfully submitted that the Minamio reference does not anticipate or even suggest the method recited in independent claims 8 and 11. Accordingly, it is respectfully submitted that independent claims 8 and 11, and the claims that depend therefrom, are clearly patentable over the prior art of record.

New independent claim 14 is directed to a semiconductor device that comprises a semiconductor chip having a first main surface and a second main surface opposite the first main surface. The first main surface has a plurality of electrode pads mounted thereon, and the semiconductor chip is mounted *on* a plurality of first external terminals and on a plurality of second external terminals so that the second main surface of the semiconductor chip faces the plurality of first external terminals and the plurality of second external terminals.

As noted above with respect to independent claims 8 and 11, the Minamio reference discloses a semiconductor element 3 *mounted on a die pad 1*. However, the Minamio reference does not disclose or suggest a semiconductor chip mounted on a plurality of first external terminals and on a plurality of second external terminals, as recited in new independent claim 14. In addition, the Minamio reference also does not disclose or suggest that the first main surface of the semiconductor chip has a plurality of electrode pads mounted thereon, and that the semiconductor chip is mounted on the external terminals so that the second main surface opposite the first main surface faces the plurality of first external terminals and the plurality of second external terminals. Therefore, it is respectfully submitted that the Minamio reference does not anticipate or even suggest the semiconductor device recited in new independent claim 14. Accordingly, it is respectfully submitted that independent claim 14 and the claims that depend therefrom are clearly patentable over the prior art of record.

In view of the above amendments and remarks, it is submitted that the present application is now in condition for allowance. However, if the Examiner should have any comments or suggestions to help speed the prosecution of this application, the Examiner is requested to contact the Applicant's undersigned representative.

Respectfully submitted,

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